holes 5, which is at least 0.5 inch from the bag opening 8 to fasten the bag to the discharging chute 18 of a powered apparatus.

[0020] As an example, by tightening the mechanism 4, the operator connects the bag opening 8 to the discharging chute 18 of a powered lawn tool with the top portion facing upward before starting the said lawn tool engine 17, as shown in Fig 6. During operation, the grass/leaf clippings and other particulates are blown through the chute 18 into the lawn bag 19, the air is vented out therefrom by means of the pores 14, apertures 10, or 11, depending on the bag materials. The top portion with low air permeability facing upward protects the operator from the venting air stream. In the case that the bag material is perforated film or the like, the grid-like structure provides the bag enough strength and air permeability. The inflated lawn bag 19 rests on the supporter 15, which is attached to the lawn tool handle 16. After the lawn bag is filled with debris, the operator then stops the motor 17, disconnects the bag and ties it at the opening, which is ready for disposal. It is also proven convenient and effective by inserting the disposable bag of the present invention into the rear grass catcher of an existing power lawn mower.

[0021] As will be apparent to those of ordinary skill within the art, numerous modifications may be made to the present invention without departing the spirit and scope thereof. This application is intended to cover any adaptations or variations thereof.

CLAIMS:

What is claimed is:

1. A disposable bag for collecting leaves, lawn debris, or particulate matter composing
    a. a top portion and a bottom portion of the said bag, when the said bag is set horizontally, with at least one of the said top and bottom portions being made of a material with an air permeability ranging

from 20 ft^3/ft^2/min to 1200 ft^3/ft^2/min, according to ASTM Standard D737 –96;

b. two side portions of the said bag, when the said bag is set horizontally, made of a material with an air permeability ranging from 300 ft^3/ft^2/min to 1500 ft^3/ft^2/min, according to ASTM Standard D737 –96;

c. an opening of the said bag to receive leaves, lawn debris, or particulate matter from a discharging chute of a powered tool, including but not limited to lawn mowers, leaf blowers, vacuum cleaners, grinders, and saws, or from a manual tool, such as a dustpan;

d. a tightening mechanism at the opening of the said bag;

e. a sealed end of the said bag sealing the said top, bottom and side portions, in the opposite to the above said opening;

2. The disposable bag of claim 1 wherein the said material is a fibrous nonwoven material.

3. The disposable bag of claim 1 wherein the said material is a fibrous nonwoven material reinforced with a woven screen or an extruded net.

4. The disposable bag of claim 1 wherein the said material is polymeric film, regionally perforated with holes, linear slits, biaxial slits, or the combinations, so that the perforated and the non-perforated areas form a grid-like pattern.

5. The disposable bag of claim 1 wherein the said material is paper, regionally perforated with holes, linear slits, biaxial slits, or the combinations, so that the perforated and the non-perforated areas form a grid-like pattern.

6. The disposable bag of claim 1 wherein the material of said top and/or bottom portions is a coated fibrous material with an air permeability ranging from 20 ft^3/ft^2/min to 1200 ft^3/ft^2/min.